



*Illinois
Building a
Presence for
Science*

Network News

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6th Annual STEM Forum & Expo, Hosted by NSTA

Kissimmee, Florida

July 12–14, 2017

<https://secure.nsta.org/conferences/registration/default.aspx?id=2017ORL>

Congratulations!!

Jamilia Leonard, kindergarten teacher from Chicago, has been chosen as a PBS Digital Innovator for 2017. PBS Digital Innovators set the bar for thoughtful tech integration in the classroom; they are not defined by the gadgets they use, but by the unique way they approach education. Their bold and enthusiastic perspective sets them apart as changemakers, and unlocks new worlds for their students.

Professional Opportunities

1. The **NSTA Learning Center** has recently been updated with a sharp new look and enhanced features, including a simplified interface and navigation. [Check it out](#). To get an invitation to access the **Illinois Science Matters** page in the Learning Center contact your state coordinator, [Mary Lou Lipscomb](#). Questions? Contact learningcenterhelp@NSTA.org.
2. **Statistical Thinking for Data Science and Analytics** – Online. Learn how statistics plays a central role in the data science approach through this five-week, self-paced MOOC (Massive Open Online Course) from Columbia University, **starting May 15, 2017**. Part of the Microsoft Professional Program Certificate in Data Science, the course will pave the statistical foundation for a further discussion on data science. For more information, click [HERE](#).
3. The NSTA Learning Center has an upcoming NGSS web seminar on **July 12, 2017**, to explore How to [Develop Storylines](#).
4. **Stem Teaching Tools** has practice briefs in that address common challenges in science classrooms. The recommendations outlined in these resources can be implemented by teachers, principals, and district leaders during NGSS implementation. Check them out at <http://stemteachingtools.org>.
5. The **National Great Rivers Research and Education Center** invites educators (formal or non-formal) for grades 5-12 to attend a **Stream Discovery workshop**. Stream Discovery focuses on training educators how to involve their student groups in water quality monitoring, analysis, and stream cleanup. 6 professional development hours available. For more information or to register for the Stream Discovery workshop **June 8th in Moline**, please visit <https://goo.gl/dtC9EZ>. If you

cannot attend the workshop but would like a Stream Discovery training to be held in your area, please contact me. Matthew Young, Illinois RiverWatch Coordinator, riverwatch@lc.edu.

6. **Children in the Stream Conference, June 27, 28, & 29**, is the country's only interdisciplinary educational fly fishing conference. An intensive three-day conference trains adults who are interested in integrating fly fishing into the curriculum in their community, school, organization or company. These comprehensive workshops use fly fishing as the foundation for investigating science, math, English language arts, visual arts and community outreach. The cost for the three-day conference is \$350 which includes instruction in the classroom and in the field, fly rod outfits, fly tying kits and publications. For more information and to register please go to: <http://www.childreninthestream.com/>. **Registration deadline is June 1.**
7. Book your summer adventure with the **American Museum of Natural History's Seminars on Science** and earn graduate credit! Explore new topics this summer with [6-week online courses](#) in the life, Earth, and physical sciences. Graduate credit is available from our university partners. Check out *Seminars on Science* at amnh.org/learn. **Special offer: Save \$50 with code SCIENCEMATTERS.**
8. **Teach Weather and Climate with Digital Media**-Grades K-12 on **Wednesday, May 17th**, 7:00 pm EST. Learn how media can empower your students to do, see, and make sense of complex topics in weather and climate. We'll discuss strategies and showcase specific media resources (all free and readily available) in this interactive session led by Jake Foster, Ph.D., WGBH. [Register Here.](#)
9. On **June 7, 2017**, there will be a **STEM Family Night Planning Workshop** for grade K–8 teachers, parent volunteers, and library staff. Gain knowledge about many free resources to help you plan your own school or library Family STEM Night. Become qualified to borrow the Fermilab Hands-on Science equipment. Learn more and register [here](#).
10. Become a **Project Learning Tree (PLT)** certified educator at this engaging hands-on workshop for formal and nonformal educators. Investigate environmental topics with indoor and outdoor activities. Learn to integrate environmental education, literature, math and social science into your existing curriculum with nature as your medium. Investigate STEM connections while becoming eligible for GreenWorks! grant funds. **Monday, July 10, 2017**, 9:00 a.m.–3:30 p.m., at Cache River State Natural Area, Barkhausen–Cache River Wetlands Center, 8885 State Route 37 South, Cypress, Illinois. **Cost:** \$35.00 Includes Prek-8 PLT Activity Guide, snacks, resources. **Register [HERE](#). For More Information:** Call 618-657-2064.
11. The **Climate Change Education Partnership Alliance** offers a series of four Effective Practices Webinars (<http://ccepalliance.org/2017/03/2017-webinar-series/>) in May and June 2017 to complement their newly released, downloadable guide, *Climate Change Education: Effective Practices for Working with Educators, Scientists, Decision Makers and the Public* (<http://ccepalliance.org/2016/12/ccep-effective-practices-guide/>).
12. **Join the CSforAll movement and teach Computer Science Principles!** --an exciting opportunity to participate in an NSF-funded Computer Science project, Mobile Computer Science Principles ([Mobile CSP](#)), that aims to address equity issues in computer science education. [Watch and learn](#) more about how students and teachers are empowered to build socially useful apps in this engaging course. The Mobile CSP project is offering a 4-week professional development course that can be taken either **online** (starting June 19) or in a **regional hybrid** format (2 weeks online and 2 weeks face-to-face, starting June 26). More details about this opportunity can be found on the [Mobile CSP](#) website.
13. The **BioBuilder 2017** workshop at Northwestern University in Evanston, IL. Is a three-day professional development opportunity to prepare educators to bring biological engineering and synthetic biology into their classrooms and laboratories. **This workshop will be held from August 1 - 3, 2017.** The workshop is directed toward high school Biology and STEM teachers,

including those looking for new ways to teach the AP content or for compelling material to teach college-bound students after the AP exam is completed. Candidates must apply through the www.bcoe.net website.

14. **Colocation America** proudly supports the development and integration of STEM learning opportunities for youth in the communities we serve (Chicago Metropolitan area in Illinois). One of the ways we support these activities is by funding innovative Science, Technology, Engineering, and Mathematics (STEM) youth programs. Youth organizations and K-12 educators with STEM programming may apply and be awarded upwards of \$7,500 for their new or reoccurring program. The **application deadline is May 26, 2017**. For more information and to apply, go to <https://www.colocationamerica.com/stem-grant>.

Grants, Awards, and Contests

1. Through the **Thank America's Teachers** program, Farmers Group, Inc. is awarding grants of \$2,500 each to teachers across America that can be put towards classroom supplies through AdoptAClassroom.org. The contest is open to full-time teachers, kindergarten through grade 12. Before applying, teachers have received a thank you through Thank America's Teachers (you can send one to yourself). There 2 contest periods and voting periods remaining this year. At the end of each period, the proposals are reviewed, and finalist entries are posted online and voted on by the general public. For official rules and specific and voting periods, please visit the [website](#). **Proposals are due May 30 and September 27, 2017.**
2. "**Excellence in Education Grants for Teachers**" Program is sponsored by the **Illinois Retired Teachers Association (IRTA) Foundation** making grants available statewide in Illinois. This special grant money will provide additional funds to public school educators (Pre-K through 12) so that their students will have the means to participate in special projects. Please **download, complete, and submit the application online** by visiting www.irtaonline.org and looking under the IRTA Foundation section. **All proposals must be submitted by June 1, 2017.** Grant awards will be presented in the fall.
3. How do you educate your students about neuroscience in a fun, creative, and engaging way? Help them create a short video for the **2017 Brain Awareness Video Contest**, sponsored by the Society for Neuroscience (SfN). Demonstrate a neuroscience concept through animation, song, skit, or any other creative approach and submit a video for a chance to win \$1,000! Videos must be submitted by an SfN member. Find a member near you with the [Find A Neuroscientist Program](#) at BrainFacts.org. Top videos will be featured on SfN.org and BrainFacts.org and showcased at Neuroscience 2017. **Submissions are due June 15.** Watch last year's winners and learn more at www.brainfacts.org/BAVC.
4. **Now through August 1st**, submit your lesson plan ideas to **Pets in the Classroom** that center around the educational use of fish, reptiles, and small animals in the classroom. Accepted entries should be in the form of videos, worksheets, photos, PP presentations, fliers, or any written lesson plans. Categories are: Small Animals/Birds (One each for PreK-2, 3-5, 6-8), Reptile/Amphibian (One each for PreK-2, 3-5, 6-8), Aquarium/Fish (One each for PreK-2, 3-5, 6-8). The winner of each category will receive a \$100 gift card! That's NINE winners!! One submission only per teacher, no duplicates from previous years. Submit your entry [HERE](#). Looking for some inspiration? [Here are some great ideas from previous contest submissions!](#)
5. **Pledge to spend at least one hour cleaning up** your classroom, stockroom, or lab at the end of this school year. If you pledge hours and then record the actual hours you spent making your classroom safer, you'll be entered to win a \$200 Flinn Scientific gift card! [Sign the pledge](#)

Student Opportunities

1. **The Summer 2017 [Science Adventures](#)** class list, registration instructions and a downloadable registration form are available on the **Fermilab [website](#)**. All the Science Adventures are online, here is a sneak peak of a few:
 - June 12–16, 2017 – Club Invention, grades 1–6
 - July 5–7, 2017 – Nature’s Power Lab, grades 5–8
 - July 10–14, 2017 – Best Games Ever! – Your Own! grades 5–8
 - August 7–8, 2017 – Aliens Among Us, grades 5–8
2. You are invited to introduce your high school students (grades 9-12 and home school students) to the **3rd Annual Celebrating High School Innovators (CHSI) competition**. Student leaders, creators, and inventors are welcome to apply for this year long competition. CHSI identifies, fosters, and celebrates Illinois high school student innovators whose contributions are exceptional and inspirational. This year, applicants can attend a CHSI Mentoring Workshop and compete in four rounds of competition during the 2017-2018 school year. CHSI will award five \$1,000 cash prizes and scholarships to ISU and Millikin. For more information and to apply, go to <http://chsinnovators.org/apply>. **The deadline to apply is September 1, 2017**. Encourage your interested students to join our team on [Saturday, June 24th at Pontiac Township High School](#) for a CHSI Mentoring Workshop where students will learn personal branding, video editing, and creating a proposal of their innovative idea. For more information please contact [Paul Ritter](#).

Classroom Resources and Great Links

1. ***How do I select phenomena to motivate student sense making?*** This web seminar explored three-dimensional teaching and learning, the explanation of phenomena and how to choose phenomena for the classroom, and how to encourage students to make sense of them. It has been archived. [Learn more and view a recording of the webinar](#).
2. The scientific evidence that underlies global warming and climate change has many connections with common chemistry topics, offering students the opportunity to make connections and better understand fundamental mechanisms. ***Finding Chemistry Connections in Climate Change***, a classroom commentary can be found [HERE](#). To continue exploring climate change with your students, check out the author’s activity on [Calculating Your Carbon Footprint](#). You may also be interested in [Global Warming in a Jar](#), and [Greenhouse Gas Simulation](#) from the AACT resource library.
3. Achieve has released a suite of **NGSS Parent Guides** to illustrate how the standards are a powerful foundation to help students build a cohesive understanding of science over time. The new guides were developed and designed based on feedback from parents and educators in NGSS-adopted states and districts. To access both the general and customizable PDF versions of the NGSS Parent Guides, [click here](#).

WHAT IS SCIENCE MATTERS?

Science Matters is an initiative of the National Science Teachers Association promoting quality science education, through the sharing of information, resources, and professional development opportunities. Each state has a Science Matters Coordinator whose primary role is to be the point of contact for distribution of science resources and opportunities to the state network.

The Illinois state coordinator is Mary Lou Lipscomb: mllscience@aol.com